

DEER HERD UNIT MANAGEMENT PLAN
Deer Herd Unit # 20
(Southwest Desert)
April 2006

BOUNDARY DESCRIPTION

Beaver, Iron, and Millard counties - Boundary begins at US-50&6 and the Utah-Nevada state line; east on US-50&6 to SR-257; south on SR-257 to SR-21; south on SR-21 to SR-130; south on SR-130 to I-15; south on I-15 to SR-56; west on SR-56 to the Lund Highway; northwest on the Lund Highway to the Union Pacific railroad tracks at Lund; southwest on the Union Pacific railroad tracks to the Utah-Nevada state line; north on this state line to US-50&6.

LAND OWNERSHIP

RANGE AREA AND APPROXIMATE OWNERSHIP

	Year-long range		Summer Range		Winter Range	
Ownership	Area (acres)	%	Area (acres)	%	Area (acres)	%
Forest Service	0	0%	0	0%	0	0%
Bureau of Land Management	132752	95%	711554	84%	167425	85%
Utah State Institutional Trust Lands	6650	5%	92989	11%	16492	8%
Native American Trust Lands	0	0%	0	0%	0	0%
Private	645	<1%	36326	4%	9788	5%
Department of Defense	0	0%	0	0%	0	0%
USFWS Refuge	0	0%	0	0%	0	0%
National Parks	0	0%	0	0%	0	0%
Utah State Parks	0	0%	0	0%	0	0%
Utah Division of Wildlife Resources	0	1%	6775	1%	3487	2%
TOTAL	140047	100%	847644	100%	197192	100%

UNIT MANAGEMENT GOALS

Overall deer numbers on this unit are considerably below recent averages and greatly below historic highs and averages. Significant increase in deer numbers will be pursued if conditions allow. Buck:doe ratios are within the minimum statewide guideline and should be maintained within that guideline.

POPULATION MANAGEMENT OBJECTIVES

- < Target winter herd size - Manage for a winter population of 3,200 deer through 2011, or until this plan is amended. This is a short-term reduction of 20% from the previous plan period and is justified as based on the discussion in Permanent Range Trend Summaries at the end of this document. The long-term objective of 4,000 deer remains unless and until a permanent change occurs in the quantity or quality of deer range on the unit.
- < Herd Composition – Maintain a region wide three-year average post-season buck:doe ratio ranging from 15 to 20 bucks per 100 does.

	Objective from past plan (2001)	Long-term Objective	2006-2011 Objective	Change
Southwest Desert	4,000	4,000	3,200	- 800

POPULATION MANAGEMENT STRATEGIES**Monitoring**

- < Population Size - Herd composition and population size will be monitored through post season and spring classification, hunter check stations, harvest surveys and computer modeling.
- < Buck Age Structure - Age structure will be monitored at hunter check stations.
- < Harvest - The main harvest strategy will be general buck hunting.

Limiting Factors (May prevent achieving management objectives)

- < Crop Depredation - Agricultural damage is almost non-existent. If problems appear, antlerless removal will be directed at specific problem areas where appropriate.
- < Habitat - Summer range is a limiting factor on this unit. Winter range seems to be abundant.
- < Predation - Predator losses on this unit may be significant, given the drastically reduced deer numbers. Alternative prey species for lions exist in the form of abundant elk and wild horses in many areas. Lion numbers will be assessed in light of deer population objectives and lion harvest adjusted accordingly. A predator management plan is currently being prepared for this unit.
- < Highway Mortality - Highway mortality is not a limiting factor on this unit.
- < Illegal Harvest - There is no evidence that illegal harvest is a limiting factor on the unit.
- < Interspecific competition - No limitation generated by elk/deer interactions has been documented.

HABITAT MANAGEMENT OBJECTIVES

- < Maintain or enhance forage production through direct range improvements on winter and summer deer range throughout the unit to achieve population management objectives.
- < Maintain critical fawning habitat in good condition. Fawn recruitment is a major concern on this unit and may be the single greatest factor limiting the population.

Condition of deer winter range on Unit 20, as indicated by DWR range trend surveys Desired Components Index.

Year	Mean DCI score for Unit	Classification	Unit-specific DCI score range: Poor	Unit-specific DCI score range: Fair	Unit-specific DCI score range: Good
1998	59	Fair	36 - 50	50 - 65	66 - 81
2003	45	Poor			

HABITAT MANAGEMENT STRATEGIES

- < Evaluate and implement potential habitat improvement projects on BLM, state, and private lands
- < Manage riparian areas in critical fawning habitat to furnish water, cover and succulent forage from mid- to late summer.
- < Evaluate opportunities to address problems created by closed canopy pinyon-juniper.
- < Cooperate with BLM on proposed Wilson Canyon Vegetation Treatment.
- < Continue existing monitoring studies, and coordinate with BLM on additional riparian monitoring.

PERMANENT RANGE TREND SUMMARIES (Added 2001)**Unit 20, Southwest Desert**

There are six range trend study transects on the Southwest Desert area. Two of these were established on DWR lands (Indian Peak WMA) in 1985 and four additional studies were added in 1998-99. All six transects are located on deer winter range, although some may be considered high elevation winter range. Trend data collected in 2003 showed a stable trend in browse species at one of two Indian Peak sites (20-1) and a slightly downward trend at the other (20-2). Browse trend along the other four transects was stable or improving, with the exception of a decrease at the South Spring (20-7) site. The condition rating for soils and herbaceous understory at the six range trend study sites was downward in most cases.

The overall DCI rating for this unit in 2003 was in the "poor" condition category. This low rating is partly a result of five years of extreme drought. However, pinyon and juniper encroachment is prevalent throughout this unit at many elevations. Additionally, forage competition is substantial in many areas of this unit and feral horse use is a problem. Summer range is limiting on this unit and a lack of aspen and good riparian areas on this range is limiting deer production. The potential for vegetative improvement by mechanical treatment and/or burning is tremendous and would accomplish much toward reversing these conditions.

Duration of Plan

This unit management plan was approved by the Wildlife Board on _____ and will be in effect for five years from that date, or until amended.